Enterasys Matrix E1 Series

Management Module Guide

Document 5143

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Preface

Welcome to the user guide for SPECTRUM's Enterasys Matrix E1 Series (SM-ENT1007) management module.

Please take a moment to read through this short preface, which explains how the information in this guide is organized and presented and lets you know how to access information about other SPECTRUM products.

In this section:

Intended Audience

How to Use This Guide [page 4]

Text Conventions [page 5]

Document Feedback [page 5]

Online Documents [page 5]

Required Reading [page 6]

Intended Audience

This guide is intended for users of SPECTRUM's Enterasys Matrix E1 Series (SM-ENT1007) management module.

How to Use This Guide

Use this document as a guide for managing the Enterasys devices described on [page 7] with SPECTRUM management module SM-ENT1007.

For general information about device management using SPECTRUM and explanations of SPECTRUM functionality and navigation techniques, refer to the topics listed under Required Reading [page 6].

Text Conventions

The following text conventions are used in this document:

Element	Convention Used	Example
User-supplied parameter names	*Courier and Italic* in angle brackets <>.	The user needs to type the password in place of <*password*>.
On-screen text	Courier	The following line displays: path="/audit"
User-typed text	Courier	Type the following path name: C:\ABC\lib\db
Cross-references	Underlined and hypertext-blue	See Document Feedback [page 5].
References to SPECTRUM documents (title and number)	*Italic*	*SPECTRUM Installation Guide (0675)*
Functionality enabled by SPECTRUM Alarm Notification Manager (SANM)	SANM in brackets [].	[SANM] AGE_FIELD_ID

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Please send feedback regarding SPECTRUM documents to the following e-mail address:

spectrum-docs@aprisma.com

Thank you for helping us improve our documentation.

Online Documents

SPECTRUM documents are available online at:

http://www.aprisma.com/manuals

Check this site for the latest updates and additions.

Required Reading

To use this documentation effectively, you must be familiar with the information covered by the SPECTRUM documents listed below.

- *Getting Started with SPECTRUM for Operators (1763)*
- *Getting Started with SPECTRUM for Administrators (0985)*
- *How to Manage Your Network with SPECTRUM (1909)*
- *SPECTRUM Views (2517)*
- *SPECTRUM Menus (2519)*
- *SPECTRUM Icons (2518)*
- *Application View and MIBs (2560)*
- *SPECTRUM Software Release Notice*

Overview

This section introduces the SPECTRUM documentation for the Enterasys Matrix E1 Series management module.

In this section:

Device Support

Application Support [page 9]

Device MIB Support [page 8]

Device Support

SPECTRUM management module SM-ENT1007 currently provides modeling for the Enterasys Matrix E1 Series devices in Table 1. Figure 1 shows the Device Icon in the Topology view.

Table 1: Supported Devices, Firmware, and Model Type

Device	Description	Firmware Revision	Model Type
1H582-51 Workgroup Switch (WS)	A 48-port 10/100 switch with three expansion slots.	Standard: 2.04.12 Federal: 2.04.10	MatrixE1
1G582-09 Gigabit Workgroup Switch (GWS)	A 6-port 10/100/1000Base-TX switch with three expansion slots.	2.04.12	MatrixE1
1G694-13 Optical Access Switch (OAS)	A 12-port Gigabit switch with a 10 Gigabit uplink.	1.02.04	MatrixE1
1H582-25		2.04.12	MatrixE1

Figure 1: Device Icon

The Matrix E1 Series is ideal for wiring closet, distribution switching, and server farm aggregation implementations. These switches provide high-bandwidth connections, advanced management, Quality of Service, and security capabilities. They support 10/100, Gigabit, and 10 Gigabit Ethernet and can handle the requirements of bandwidth-intensive enterprise applications such as video conferencing, distance learning, enterprise resource planning, disaster recovery, and simultaneous intranet and Internet connectivity.

Device MIB Support

Table 2 and Table 3 describe standard and device-specific MIB support for the Enterasys Matrix E1 Series (SM-ENT1007) management module in SPECTRUM.

Note: See the vendor's device firmware guide for more details about device MIB support: http://www.enterasys.com/download.

Table 2: Standards-Based MIBs

Standards-Based MIBs
RFC 1213 (MIBII)
RFC 1493 (Bridge MIB)
RFC 1757 (RMON MIB)
RFC 2674 (802.1p\Q MIB)
RFC 2737 (Entity MIB)
RFC 2933 (IGMP MIB)
IEEE 802.1-PAE-MIB

Table 3: Vendor MIBs

Vendor MIBs
Ctenviron-mib
Ct-vlan-classify-mib
Ctbroadcast-mib
CtDownload-mib

Vendor MIBs
Ct-priority-classify-mib
Ctron-cdp-mib
Ctron-timed-reset-mib
Ctron-rate-policing-mib
Ctron-alias-mib
Ctif-ext-mib
Ctron-q-bridge-mib-ext-mib
Enterasys-radius-auth-client-encrypt-mib
Enterasys-mac-locking-mib
Enterasys-mac-authentication
Enterasys-configuration-management
Enterasys-policy-profile-mib
System-resource-mib

Application Support

The Enterasys Matrix E1 Series management module supports various RFC and IEEE standard applications. The applications are created and associated with the device model based on the specific device's capabilities. The following guides contain complete documentation for each of the standard applications supported by SPECTRUM:

- *Bridging Applications (2562)*
- *MIB II Applications (2561)*
- *Routing Applications (3080)*
- *Technology Applications (5065)*
- *Transmission Applications (5064)*

Traps, Events, and Alarms

This section describes the device-specific events and alarms supported by the Enterasys Matrix E1 Series (SM-ENT1007) management module.

Trap Support

Table 4 [page 11] and Table 5 [page 12] list the supported standard and device-specific traps. For proprietary trap descriptions, see Device-Specific Trap Descriptions [page 13].

Note: The Optical Access Switch (OAS) 1G694-13 does not support the proprietary traps listed in Table 5.

Table 4: Standard Trap Support, Events, and Alarms

Trap Name and Trap OID	Variable Bindings	Event Generated	Alarm Generated	Alarm Severity
Coldstart 0.0	None	0x10306	None	None
LinkUp 3.0	1.3.6.1.2.1.2.2.1.1 1.3.6.1.2.1.2.2.1.7 1.3.6.1.2.1.2.2.1.8	0x220002	None	None
LinkDown 2.0	1.3.6.1.2.1.2.2.1.1 1.3.6.1.2.1.2.2.1.7 1.3.6.1.2.1.2.2.1.8	0x220001	0x220001	Yellow
Authentication Failure 4.0	None	0x1030a	0x1030a	Yellow
RFC1493 – New Root 1.3.6.1.2.1.17.6.1	None	0x0d0001	None	None
RFC1493 – Topology Change 1.3.6.1.2.1.17.6.2	None	0x0d0002	None	None
RFC1757 – RisingAlarm 1.3.6.1.2.1.16.6.1	1.3.6.1.2.1.16.3.1.1.1 1.3.6.1.2.1.16.3.1.1.3 1.3.6.1.2.1.16.3.1.1.4 1.3.6.1.2.1.16.3.1.1.5 1.3.6.1.2.1.16.3.1.1.7	0x10810	0x10810	Yellow

Trap Name and Trap OID	Variable Bindings	Event Generated	Alarm Generated	Alarm Severity
RFC1757 – FallingAlarm 1.3.6.1.2.1.16.6.2	1.3.6.1.2.1.16.3.1.1.1(1,0) 1.3.6.1.2.1.16.3.1.1.3(2,0) 1.3.6.1.2.1.16.3.1.1.4(3,0) 1.3.6.1.2.1.16.3.1.1.5(4,0) 1.3.6.1.2.1.16.3.1.1.8(5,0)	0x10811	0x10811	Yellow

Table 5: Device-Specific Trap Support, Events, and Alarms

Trap Name and Trap OID	Variable Bindings	Event Generated	Alarm Generated	Alarm Severity
wgPsRedundant [page 13] 1.3.6.1.4.1.52.6.1804	1.3.6.1.4.1.52.4.1.1.8.1.2.1.1.1(1,0)	0x021b070c	None	None
wgPsNormal [page 13] 1.3.6.1.4.1.52.6.1802	1.3.6.1.4.1.52.4.1.1.8.1.2.1.1.1(1,0)	0x021b070a	Clears Alarm 0x021b070b	None
wgPsNotRedundant [page 13] 1.3.6.1.4.1.52.6.1805	1.3.6.1.4.1.52.4.1.1.8.1.2.1.1.1(1,0)	0x021b070d	None	None
wgPsFail [page 13] 1.3.6.1.4.1.52.6.1803	1.3.6.1.4.1.52.4.1.1.8.1.2.1.1.1(1,0)	0x021b070b	0x021b070b	Yellow
etsysMACLockingMACViolation [page 13] 1.3.6.1.4.1.5624.1.2.21.6.1	None	0x3f90000	0x3f90000	Yellow

Device-Specific Trap Descriptions

The following device-specific traps are supported (see Table 5 for more information).

wgPsRedundant

This trap is generated when the device detects that the power supply is in the redundant state.

wgPsNormal

This trap is generated when the device detects that the power supply has returned to normal.

wgPsNotRedundant

This trap is generated when the device detects that the power supply is not in the redundant state.

wgPsFail

This trap is generated when the device detects that the power supply has failed.

etsysMACLockingMACViolation

If MAC Locking is globally enabled and specifically enabled for this port, then this trap is sent when a packet is received with a source MAC that differs from all the currently locked MACs for the port specified in this instance of the notification.

Device Views

This section describes device-specific MIB views for the Enterasys Matrix E1 Series that are accessible from the Icon Subviews menu of the **MatrixE1** Device icon.

Note: See the vendor's device firmware guide for more details about device MIB support: http://www.enterasys.com/download.

In This Section

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Web Administration [page 14]

NetSight Element Manager [page 15]

Entity Tables

Note: From the Icon Subviews menu for the **MatrixE1** Device icon, select **Entity Tables > Physical/ Logical Tables**.

This menu selection provides access to the RFC2737App's Physical and Logical Entity tables (see Application Support [page 9]).

Web Administration

Note: From the Icon Subviews menu for the **MatrixE1** Device icon, select **Web Administration**.

This menu selection provides access to the Enterasys Matrix E1 Series Web Administration view.

Note: By default, the Web Admin URL is `http://<0x1027f>` (the `Network_Address` attribute). You can use the Global Attribute Editor in Search Manager to change this. See the Global Attribute Editor section of the *Search Manager User Guide (2383)* for more information.

NetSight Element Manager

Note: From the Icon Subviews menu for the device icon, select **NetSight Element Manager**.

This menu selection launches the Enterasys NetSight Element Manager application if it is available. In order for SPECTRUM to find Netsight, you must set the `NETSIGHTPATH` environmental variable equal to the path to the NetSight Element Manager application.

When setting the `NETSIGHTPATH` environmental variable, be sure to use the path to the location of the Element Manager executable, not the path to the location of the installation.

For example, if the NetSight Element Manager was installed in a Windows environment in the `Program Files\Enterasys Networks\NetSight Element Manager` directory, the path to the executable would be:

```
C:\Program Files\Enterasys Networks\NetSight Element Manager\Bin
```

Note: For information on how to set an environmental variable, refer to the documentation for your operating system.

Once you have set the `NETSIGHTPATH` environmental variable, you must restart the SpectroGRAPH and the SPECTRUM Control Panel (if you are using it to launch the SpectroGRAPH) in order for the NetSight Element Manager menu option to become available.

SPECTRUM Integrations

This section describes SPECTRUM products that integrate specifically with the Enterasys Matrix E1 Series management module.

Table 6: SPECTRUM Integrations

Supported SPECTRUM Product	Documented in...
VLAN Overlay	*VLAN Management User Guide (3543)*
SNMP V3	*SPECTRUM SNMPv3 User Guide (5124)*

Known Anomalies

This section describes known anomalies of the Enterasys Matrix E1 Series of devices modeled in SPECTRUM.

Corrupted Port Advertise Ability Values

Prior to firmware version 2.04.12, port advertise ability values may have become corrupted. For example, more than 48 physical ports could appear in the ifTable when only 48 exist.

Sub-Interface Stacking

The Enterasys Matrix E1 Series of devices do not support sub-interface stacking because they do not populate the ifTable with sub-interface information.

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